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ABSTRACT

This technical report presents the background, procedures, and outcomes of a shortcourse conducted at the University Center of Dschang (UCD), Cameroon, July 9-15, 1989. The shortcourse trained the 32 participants to use curriculum planning skills to analyze how the UCD curriculum addresses the needs of Cameroon women and prepares graduates to work in programs directed toward assisting rural women. Included in the report are explanations of the curriculum planning process, instructional methods used, results of group work, proposed recommendations, and evaluation results. A training manual was also developed to provide background information and exercises for each course segment. A review of the literature briefly looks at agricultural production, the woman's role in activities and decision making, women and agricultural outreach, curriculum planning, and implications for educational institutions. Evaluation of the shortcourse by participants indicated all respondents believed the information to be useful. Two themes recurred among participant discussions: first, the types of efforts that are needed to reach rural women, and second, the type of training needed to prepare graduates to work with rural women. Eleven recommendations by participants provide a guide for further planning. Appendixes include participant names and affiliations, recommendations, the agenda, and evaluation forms. 14 references. (DB)

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A Technical Paper Prepared for the
University Center of Dschang and USAID
Agricultural Education Project,
Dschang, Cameroon
and International Programs, Institute of
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Gainesville, Florida

August 21, 1989

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PREFACE

An increasing volume of development literature recognizes women and agricultural households as central to the success of development efforts. Projects have targeted women's subsistence production and small- scale marketing enterprises as well as commercial production to increase food production and income. The logical next step is to examine how educational institutions, as they train graduates for development work, can address agricultural production in the educational curriculum. The University Center of Dschang (UCD), Cameroon, the nation's primary agricultural training institution, seized the opportunity assess how UCD addresses women's agricultural production in the process of revising the overall university curriculum.

This technical report presents the results of a six day, intensive shortcourse, "Curriculum Planning with an Emphasis on Women and Agricultural Households," conducted at the University Center of Dschang, July 9-15, 1989. The intensive shortcourse was developed and carried out by Dr. Barbara Taylor and Dr. Suzanna Smith, Department of Home Economics, Institute of Food and Agricultural Sciences, University of Florida. The shortcourse was supported by the U.S. Agency for International Development Program Support Grant funds and by International Programs at the University of Florida. The course was supported by and offered in conjunction the with USAID Agricultural Education Project (AEP) at UCD. A total of 32 participants attended the shortcourse.

The shortcourse trained faculty to use curriculum planning skills to analyze how the UCD curriculum addresses the needs of Cameroon women and prepares graduates to work in programs directed toward assisting rural women. Over the course of the workshop, participants went through the steps of curriculum planning, applying skills specifically to planning a women and agricultural households program. As a result of the shortcourse, participants recommended specific curriculum changes that would enable UCD to train students to meet the needs of women and agricultural households.

Representatives of government ministries and other organizations working with rural women worked with UCD faculty in this process. We attribute much of the success of the workshop to the dynamic combination of faculty and organization representatives. Faculty participants brought to the training technical expertise that would serve as a foundation for a women and agricultural households program, knowledge of the UCD curriculum, and of curriculum revisions in progress. Outside participants from ministries and organizations brought to the workshop experience and insight into existing conditions in rural areas, women's needs, and avenues for improving quality of life. Together these participants became a knowledgeable, energetic force, committed to

identifying women's needs and examining the curriculum in terms of its responsiveness to the needs of both women farmers and UCD graduates.

This report discusses in depth the background, procedures, and outcomes of the shortcourse. Included are detailed explanations of stages of the curriculum planning process, instructional methods used, results of group work, proposed recommendations and evaluation results. Additional background information on shortcourse content can be found in the Sourcebook, the training manual developed to provide background information and exercises for each course segment.

ACKNOWLEDGEMENTS

The following people were instrumental in developing and implementing the shortcourse. Dr. Rene Owona, Director General of the University Center of Dschang, initiated the contacts and exchanges between UCD and UF faculty regarding the development of this program. His vision — of addressing the needs of women farmers at UCD — provided the catalyst for the shortcourse.

Dr. Ruben Njwe, Director of Research and Extension, was instrumental in arranging informative meetings with Ministry and other officials, organizing and participating in the UCD advisory committee, and facilitating ongoing communication between UCD and the University of Florida concerning the project. Advisory Committee members Dr. Joyce Endeley, Mrs. Therese Fouda, and Dr. Jean Nyemba identified and contacted the majority of Ministry and organization participants. Committee member Mr. Pierre Faa documented committee progress and provided logistical support during the course. All committee members provided insightful feedback that shaped the content and format of the workshop.

Dr. Mitch Flinchum, Curriculum Director, coordinated the shortcourse arrangments at UCD. He provided suggestions for course delivery and directed complicated logistical arrangements, including providing travel to and from Dschang and securing lodging for the outside participants.

Ms. Camilla Harshbarger, doctoral student, Department of Anthropology, University of Florida, provided technical assistance during the shortcourse. This included facilitating group discussions, recording group responses, making on-site revisions of instructional aids, and coordinating secretarial support assigned to the shortcourse.

Dr. Cliff Taylor, Professor Program Evaluation, Department of Agriculture and Extension Education, University of Florida, designed three evaluation instruments specifically for use in this shortcourse to determine the effectiveness of this process for curriculum planning.

Shortcourse participants tirelessly contributed their insights and expertise throughout the week. As a result of their efforts, the University Center of Dschang has a document of recommendations to guide further curriculum planning on women and agricultural households.

INTRODUCTION

Background

This shortcourse is the outcome of a series of exchanges between administration and faculty of the University Center of Dschang and the University of Florida. In 1986, Dr. Rene Owona, Director General of UCD, invited Dr. Barbara Taylor and Dr. Doris Tichenor of the University of Florida (UF) Department of Home Economics to work with UCD to explore the possibility of establishing a program that would train graduates to meet the needs of rural women. Dr. Owona believed that the existing agricultural training program did not adequately target women farmers nor address other household activities for which women were responsible, although those activities were also known to affect agricultural productivity.

Drs. Taylor and Tichenor traveled to Cameroon in May, 1986, to conduct a needs analysis and assess the potential for a program. The results of over 50 interviews with faculty and ministry representatives indicated that (a) there was an interest in establishing a program; and (b) specific educational needs existed in the areas of agricultural production, food processing, food preservation, nutrition, maternal and child health, and income-generating activities. A complete description of these procedures and findings is presented in the technical report produced by Drs. Tichenor and Taylor, "An Analysis of the Need and Potential for the Introduction of a Home Economics Curriculum at the University Center of Dschang."

UCD and UF administration and faculty continued to discuss the potential for a program and the kind of assistance UCD might need to move forward in planning. In 1988, Dr. Taylor, Dr. Tichenor, and Dr. Smith submitted a proposal for USAID Project Support Grant funds to finance a shortcourse at UCD, and the proposal was approved. The proposed shortcourse on curriculum planning was designed to respond to UCD's previous requests for assistance with determining if and how rural women's needs could be addressed at UCD.

In February 1989, Dr. Smith traveled to Dschang to work with the project advisory committee, make logistical arrangements, and meet with selected ministry officials to inquire about their interest in appointing representatives to attend the shortcourse. Dates for the shortcourse were established, and during the spring of 1989 the committee proceeded with planning, including making logistical arrangements and selecting participants.

The final group of 32 participants included 11 representatives from ministries and organizations and 21 faculty. Due to other university obligations some faculty could not attend all sessions. However, a total of 22 participants attended the majority of sessions and completed the final evaluation for the course. The names and departmental or organizational affiliations of participants are listed in Appendix A.

Purposes

The shortcourse responded to requests by UCD for assistance with examining if and how a program at UCD could prepare graduates to address the needs of women and agricultural households. University of Florida faculty proposed to train UCD faculty to systematically analyze the UCD curriculum to identify ways to strengthen or modify the curriculum to make it more relevant to the needs of rural women and more useful to UCD graduates. In addition, because curriculum planning skills were general and could be applied to any educational program, the shortcourse was considered relevant to departments at UCD that were in the process of planning the third and fourth years of the new curriculum.

The first purpose of the shortcourse was to:

- Provide participants with the knowledge and skills to design and implement a women and agricultural households or other program at UCD.

In addition, during the shortcourse planning phase, the advisory committee recommended that representatives of government ministries and other organizations be invited to participate in the workshop. The committee believed that these representatives would provide current, accurate information and insights about the needs of Cameroon women and the needs of field staff and supervisors working directly with rural women. Furthermore, previous interviews with these representatives indicated that despite their common goals, there was little opportunity for collaboration among ministry personnel and UCD faculty.

The second purpose of the shortcourse was to:

- Provide a forum for establishing working relationships between UCD, Government Ministries, and others involved in the development and delivery of programs that address the needs of rural women.

Objectives

Overall objectives were established to guide the shortcourse and specify indicators of the effectiveness of the shortcourse. At the conclusion of this shortcourse participants would be able to:

- Use information presented by relevant organizations to strengthen, modify, or establish content or curriculum related to women and agricultural households at UCD.

- Identify areas of potential collaboration and cooperation between UCD and other organizations involved in the development and delivery of programs that address the needs of rural women.

- Use the steps of a curriclum planning model to analyze the curriculum at UCD to determine what is needed to establish content or curriculum related to women and agricultural households.

- Develop a plan to guide the development of content, curriculum, or inservice training related to women in agriculture for (a) UCD students and (b) graduates and other personnel working in the field, to increase awareness of issues and improve technical knowledge and expertise in working with rural women.

In addition, objectives were established for each training module as indicators of the effectiveness of that particular training segment.

Outcomes

The products of the shortcourse were:

- A set of recommendations for UCD administration concerning curriculum changes that would enable UCD to train students to meet the needs of women and agricultural households.

- A preliminary agenda or plan for initiating and developing a proposal for a program related to women and agricultural households.

Participants' recommendations and preliminary plan for initiating a proposed program are summarized below. The complete document is presented in Appendix B.

Recommendations and Preliminary Plan

Participants made the following recommendations, which were presented to UCD administration at the closing ceremonies.

- Provide teaching programs to ensure the supply of a competent work force to address the needs of women in general and rural women in particular.

- Strengthen existing courses that relate to women and agricultural households.

- In the short run, introduce new courses to address the specific needs of women and agricultural households. In the long run, following appropriate evaluations, these courses could lead to the creation of a program in one of the options and eventually to a department.

- Study the potential for increasing the intake of women students.

Summary

The shortcourse, "Curriculum Planning with an Emphasis on Women and Agricultural Households," was initiated in response to requests for assistance by the University Center of Dschang, Cameroon. A needs analysis indicated both need for and interest in a shortcourse that would train faculty to examine whether and how the program could prepare graduates to address the needs of women and agricultural households. Specific purposes and objectives were established by the UCD advisory committee and UF faculty.

The shortcourse was based on and bridged two areas of study, women and agricultural households and curriculum planning. Through lectures, paper presentations, and training materials participants were introduced to fundamental concepts regarding women and agricultural households as a foundation for subsequent work in this area. Participants were asked to draw on their experience and observations to identify the specific needs of women and agricultural households in Cameroon and were taken through the steps of a curriculum planning model. This process allowed participants to operationalize curriculum concepts in terms of a women and agricultural households program that would prepare graduates to address those needs.

The next section of this report briefly reviews the literature that provided the foundation for the shortcourse and which was covered in the training and included in the Sourcebook. This is followed by a discussion of training procedures and outcomes. Results of evaluations are also presented. In the final section we discuss our own conclusions and future implications of the shortcourse results.

REVIEW OF LITERATURE

An estimated three-fourths of Cameroon's population live in rural areas, and a little more than half of rural residents are women. Agriculture is their principle occupation: Women produce an estimated 90 percent of subsistance production, and make up about 53 percent of agricultural workers (Pentang, 1989).

Women farmers raise the majority of food crops in Cameroon on small farm operations. Women are also responsible for crop storage and preservation, and are actively involved in marketing agricultural surplus, making their products an important source of individual and household revenue. Both adequate food availability and improved income have beneficial impacts on family standard of living, health, and nutritional status.

Women's agricultural production is hampered by lack of access to both formal and extension education and to other resources, such as improved technologies, inputs, and credit (Kilo, 1989). These resources could improve women's production by reducing extreme demands on women's time (10-12 hour work days) and providing needed assistance such as child care (Kilo, 1989; Pentang, 1989).

Issues related to women's agricultural production are particularly important in light of continuous decreases in food crop production and threatened food shortages (Nyemba, 1987). Consequently, efforts to improve Cameroon's food self-sufficiency may be enhanced by understanding women's contributions to agricultural and household production and decision-making, and by educating outreach workers regarding women's roles in agricultural production.

Agricultural Production

Recent models of agricultural households have expanded the definition of farm production to include not only crop and livestock production but a range of activities in which household members are involved (Overholt, Anderson, Cloud, and Austin, 1985). These activities are:

1. Agricultural production: The output of crops and livestock (cereals, vegetables, tree crops, dairy products, poultry, livestock) for home consumption or market sale.

2. Household production: Output of goods or services produced within the household for home consumption or market sale (food processing and preparation, provision of water and cooking fuels, laundry, cleaning, health care, house building and maintenance).

3. Human capital production: Child bearing, child care, and transmission of knowledge and skills.

4. Self-employment in the informal market sector: Off-farm activities such as personal services and marketing.

5. Wage labor: Paid employment in the agricultural, or other sectors.

Research suggests that both farm and household activities must be recognized to adequately address men's and women's roles in agricultural production.

Activities and Decision-Making

Presumably, household members decide to allocate their time to activities that will benefit other members and household welfare in general. However, what is in the best interest of the household may not be in the best interest of individual members; therefore, members also base their decisions on their individual interests and what they personally have at stake.

Men and women may have different production priorities and interests which affect their decisions (Overholt, Anderson, Cloud, and Austin, 1985, p.25). If their interests are separate or opposing, one may want to invest more time and resources into staple crops and the other into cash crops. One may wish to save money for children's education and the other to purchase consumer items.

For example, studies from Northern Cameroon indicate that women who must purchase food and other household items may resist husband's pressures to divert labor away from women's vegetable fields to men's rice crops. A husband who is able to pay a woman for her time in cash crop production may be more likely to divert her from her fields if the pay is enough to buy food or other household items (Jones, 1986). The relative bargaining power of the two sexes within the household affects individual decision-making and the subsequent allocation of labor to particular activities. Thus, an understanding of agricultural production requires an understanding of individual as well as household interests and decision-making processes.

Women and Agricultural Outreach

Research indicates that education increases agricultural productivity and is associated with other indicators of economic development. Thus, education not only for women themselves but for those working with women and their households, may be fundamental to improving agricultural production and general quality of life.

Recent research (Nyemba, 1987) indicates that in parts of Cameroon extension workers have been less than successful at reaching small farmers due to difficulties with transportation and organization, discrepancies between extension interventions and small farmer

priorities, and small farmers' distrust of extension workers' recommendations. Frequently, outreach efforts are directed at male farmers, while the contributions and needs of women are overlooked. To an extent this may be the result of a general emphasis on large-scale and commercial production. For example, there is some evidence that extension agents visit small farmers when it is time to market cash crops rather that food crops. Additional findings indicate that extension resources have been distributed unequally, favoring wealthier farmers (Nyemba, 1987).

Because women are responsible for household as well as agricultural production, extra effort and planning may be required to reach women at convenient times (Kilo, 1989). Yet many extension agents stop at villages to deliver agricultural products (e.g., pesticides) instead of going to the farms, making it impossible for some women farmers to obtain needed inputs.

Some research has demonstrated that female farmers prefer to work with female workers and that this same sex interaction is more successful at promoting innovative agricultural practices than male-female combinations. However, there are often few educated female extension workers to meet the needs of large numbers of female farmers. Despite these obstacles, research has indicated that effective and innovative extension programs, delivered by male and female agents, can reach women farmers in Cameroon. Successful approaches include working with women one-on-one and conducting demonstrations and using visual aids (Koons, 1988).

Agricultural educational institutions are particularly important in recruiting and educating professional women and men who will discover and use innovative methods to train rural women to use available inputs and improved technologies (Cloud, 1985). These institutions also play a role in conducting additional research to use as a basis for planning outreach programs that will accurately and effectively address the needs of women farmers.

Curriculum Planning

Effective curriculum planning takes into account changing societal needs and concerns of persons served by the institution. Factors such as household division of labor and gender roles, cultural beliefs and practices, demographic characteristics (e.g., rural populations, age structure, educational levels), and political priorities and mandates impact curriculum. Being in tune with these needs is especially important in planning curriculum to train graduates to work at local and national levels of society.

Curriculum decisions in all institutions ultimately address the question, "Should the emphasis be placed on a body of knowledge (i.e., discipline) or on selected knowledge that relates to the needs and interests of the learner?" (Doll, 1986; Hunkins, 1980). Recent models of curriculum development (Doll, 1986; Hall and Hord, 1987; Hunkins, 1980) take into account the advantages of multidisciplinary programs that

address needs and interests of learners. Such programs are defined on the basis of competencies needed by graduates rather than subject matter area. These models may be most appropriate to the development of educational programs or women and agricultural households.

Hunkins' (1980) curriculum planning model, which focuses on needs and interests of learners, may be useful in creating new programs as well as improving curricula of existing programs at educational institutions. This curriculum model has five major stages. The first stage effectively provides for situational analysis. It considers the social and political forces affecting curriculum and raises philosophical questions about how learners develop and the purpose of their education. The curriculum conceptualization stage directs planners to outline and agree on the approach that will be employed in the planning process.

The third stage, curriculum diagnosis, addresses what learners need to know and what is needed to address these needs. This stage provides for review of the current master management plan and sets the contextual stage for revisions and development of new programs. It is in this stage that goals are generated and objectives are described. The fourth stage establishes criteria for selecting and organizing the content. It explores major ideas and general fields to be included. It analyzes the scope of the program and how subject matter will be organized, and determines the instructional experiences to be offered.

The fifth and final stage, curriculum implementation, evaluation, and maintenance, involves pilot testing and monitoring the program during this test. It delineates the feedback needed to refine the plan for implementation. Both formative (process) and summative (end result) evaluations are employed to determine if the appropriate courses are in place to maintain the program.

Many persons other than administrators and teachers can impact the educational process (Schubert, 1986). Research suggests that faculty, administrators, and stakeholders alike need skills in the curriculum process (Hall and Hord, 1987). Effective curriculum considerations begin with establishing communication channels within and outside the institution (Doll, 1986). This requires good planning and input from persons skilled in conceptualizing the needed program. It also requires input from stakeholders who need competent graduates from the program.

For some institutions, curriculum planning and program improvement may occur through trial and error. Other curriculum and instructional plans are generated systematically. While good planning may not guarantee the best curriculum, it is clear that quality programs will not result from inadequate planning.

Implications for Educational Institutions

Educational institutions educate outreach workers and future teachers and researchers are faced with questions about how best to prepare graduates to address rural women's needs. The structure and

functioning of the agricultural household is complex, and a number of forces affect agricultural decision-making and production. Sophisticated information is needed regarding factors that influence women's acceptance of innovative practices, use of outreach services, and practice of effective agricultural techniques. Thus, the institution must ask how women and households are currently treated in existing courses and what additional subjects are needed to more accurately represent women's roles and needs.

In addition, the evidence indicates that outreach workers need to be specifically trained to understand the dynamics of women's participation in agriculture and to develop effective skills for working with this target audience. Thus, the institution must evaluate how students are currently trained, through coursework or practical experiences, to conduct field work with women farmers, and what additional coursework, content, or experiences are needed. In addition, the institution may wish to assess the need for followup training to continue to inform and support outreach workers.

Input from ministries and organizations that work directly with farmers is particularly valuable. These organizations can work with the university to obtain information about the needs of farmers and the needs of technicians and agents who provide new technologies and research-based information. The university can then examine the effectiveness of existing curriculum in training graduates to address the needs of rural women farmers.

PROCEDURES

Instructional Techniques

The shortcourse was designed to take participants through the initial steps of curriculum planning. Conceptual information and application were structured so participants actually developed the essential components of a curriculum proposal. In the future, this proposal could be used by faculty and administration to initiate a program to prepare graduates of UCD to work in positions that address the needs of women and agricultural households.

Participants systematically addressed each step of the curriculum planning process by proceeding through the following steps.

1. Analysed needs of women and agricultural households in Cameroon.
2. Developed statements of mission, goals and objectives of a program that would address those needs.
3. Assessed existing UCD curriculum for strengths and weaknesses in course content as related to the needs of women and agricultural households.
4. Identified existing design considerations, such as institutional resources and needs, that would affect the feasibility and type of program that might be established.

The content and skills covered in each of these steps are reviewed below, and followed by a summary of the group process used to take participants through the stages of curriculum planning.

Needs Analysis

The first three days of the course were devoted to the analysis of needs of women and agricultural households in Cameroon. The opening session included presentations from the Ministries of Community Development, Ministry of Social and Women's Affairs, Nutrition Research Institute, and Maison de la Femme. Speakers addressed their unit's activities and progress in addressing the needs of women and agricultural households.

Using the Nominal Group Technique, workgroups contined to identify needs of women and agricultural households and the need for trained graduates. The Nominal Group Technique maximized the opportunity for participants from the various ministries and organizations to contribute valuable observations from their work experiences.

Mission, Goals and Objectives

A statement of aims, purposes and direction (mission and goals) for the program was developed by each group. Objectives indicating outcomes to be achieved by the learner were established.

Curriculum Content

Participants evaluated curriculum content for its appropriateness to the objectives and needs established by the group. Appropriate courses in the current UCD curriculum were identified and gaps were described.

Design Considerations

Design considerations focused on resource availability and needs that would facilitate or inhibit program development. Participants responded to major questions concerning program alternatives, options for program location, sources of funding, available and needed resources, and qualifications of potential students.

Group Process

Based on the purpose of the workshop and needs of the group, the workshop was intensely participatory, relying heavily on small work groups and large group discussion to accomplish tasks and complete intermediary and final products. Participants were divided into work groups of 5-7 faculty and ministry and organization representatives and were asked to complete exercises for each step of the curriculum planning process. In general, each work group completed the assigned tasks and an appointed recorder reported results to the large group for further discussion and clarification.

With the exception of the segments on design considerations and final recommendations, each group report stood alone and did not require the large group's approval. However, small group responses for each step were recorded for use in preparing the entire group's program proposals and recommendations.

For the final segment on recommendations, work groups addressed one of the following topics: (a) potential for a program, and (b) resources and needs or constraints, including qualifications of students entering the program. Results were reported to the large group and discussed at length, resulting in a few minor changes.

A committee of three ministry representatives and one faculty member was appointed to compile the results and develop a formal, written statement of recommendations to be presented to UCD administration. The statement was read in English and French to the large group and was followed by further discussion, but was not changed. The final recommendations were formally presented at the closing ceremonies by a selected member of the committee.

Training Materials

A participant training manual or Sourcebook was developed to provide background information and exercises for each segment of the course. Seven modules on women and agricultural households and curriculum planning were developed. The first two modules were designed to provide participants with conceptual and practical tools for analyzing women's roles in agricultural production. These modules were based, in part, on the work of C. Overholt, M.B. Anderson, K. Cloud, and J. Austin on gender roles in agricultural development. The other five modules were structured around the components of an applied curriculum development model featured in the works of F. Hunkins and R. Doll.

The first section of the Sourcebook provided summary background information of content covered in each training module. The second section, the Participants' Packet, contained participant handouts and exercises. Transparencies and a teaching outline were also developed to accompany each module.

Agenda

As discussed above, the shortcourse agenda was developed to move participants through the curriculum planning process. The complete agenda is presented in Appendix C.

Evaluation

Both formative and summative evaluations were built into the course at strategic points to assess the effectiveness of the modules, and to determine if adjustments in the course were needed. The first evaluation followed the modules on women and agricultural households. The second evaluation followed the modules on curriculum planning. An overall evaluation was administered on the last day of the course. The evaluation results are presented in detail in the section of this report, "Evaluation Results." Evaluation instruments are presented in Appendix D.

OUTCOMES OF PLANNING STEPS IMPLEMENTED DURING THE SHORTCOURSE

As discussed in the previous section, work groups proceeded through the steps of a curriculum planning model. Here, we synthesize the collective results of group work for four major steps in curriculum planning: (a) needs analysis; (b) mission and goals; (c) objectives and curriculum content; and (d) other design considerations.

Needs Analysis

The needs analysis conducted in this short course considered needs at two levels: (a) needs of women and agricultural households, and (b) needs for trained graduates to work in positions addressing women and agricultural households. Other situational forces that had the potential to impact curriculum were also considered at this stage.

Participants identified seven broad areas of needs that included the following:

- improved family welfare in the areas of nutrition, primary health care, sanitation, child care, and family planning;
- access to resources, including land and credit;
- labor-saving technologies in the household, including greater access to water and electricity;
- appropriate technologies for women in food crop production, processing, conservation, and storage;
- training in marketing food crop products, household products, and services and in small business management and marketing;
- greater access to adult education;
- involvement in decision-making that impacts women and their households.

In addition, ministries and organizations identified a need for trained graduates to work in positions addressing women and agricultural households, including the following personnel:

- teachers for secondary and high school levels and specialized training centers;
- educators in preventative family health and hygiene and sanitation;

- literacy instructors and supervisors;
- coordinators or managers of womens' cooperatives;
- subject matter specialists in agriculture and food technology to conduct field work and train technicians;
- provisional level coordinators and divisional level supervisors in ministries and organizations;
- child care advisors and supervisors.

Additional forces that have the potential to impact curriculum were also considered by participants during the needs analysis phase. Groups highlighted several social and political factors. They noted that the Cameroon Constitution guarantees sex equality, provides free public education for males and females, and provides non-discriminatory access to employment and salaries for males and females. Participants also acknowledged that the country recognizes the valuable contributions women make, and that the government strongly supports programs addressing the needs of women. However, participants also noted that cultural perceptions of gender roles and traditional customs and practices may differ from these basic constitutional rights.

Participants' perceptions of the need for education for women were supported by the Tracer Study of UCD graduates (Tchala-Abina, 1989) presented in the workshop. That study indicated a low percentage of women students take advantage of free public education beyond the mandatory school age of 15 years, further confirming the need for trained graduates to work in positions that address women's educational needs. There was a strong feeling that the number of women students at UCD should increase and that an additional program is needed if this is to occur.

The Needs Analysis phase provided the basis for the remaining group outcomes. Consequently, the first three days of the shortcourse were devoted to a complete examination and identification of needs.

Mission and Goals Statements

The development of Mission and Goals statements by participants was based on the previous analysis of the needs of women and agricultural households. The mission and goals statements that emerged from group discussions are presented below.

Program Mission

Participants were asked to develop a program mission statement based on identified needs. The mission was defined as a broad statement of the aims, ideals, purposes, and visions of the program. Emphasis was placed on a long-term vision of what the program is or is striving to become.

Examples of mission statements were presented to illustrate the three basic elements of mission: (a) what functions and services the program provides in attempting to meet certain needs; (b) how the program goes about or plans to go about carrying out its role, through activities, technologies, and methods; and (c) who are the program's primary learners or other stakeholders.

Following are unedited mission statements developed by the four work groups:

- Address women's needs by generating knowledge, disseminating information, and training personnel to work in various areas in order to help women contribute more efficiently to the development process, and to improve the general well-being of the population.

- The Department of Home Farm Management should provide teaching, research, and extension services with priorities in the areas of agriculture, improved family welfare, and natural resources, to address the needs of women and agricultural households in Cameroon and Africa.

- The mission is to study and access the rural environment and to transmit appropriate knowledge to ensure a better standard of living in the rural area and to render women self-actualized citizens.

- To help UCD realize its maximum potential in addressing educational, technological and organizational needs of women in agricultural households for their full integration in rural development in Cameroon.

Program Goals

Participants used their mission statements as a foundation for more specific goal statements that established what the program aims to accomplish. Goal statements provided an overall direction for a program and expected outcomes or measures of intended program accomplishments. Groups developed similar or overlapping goal statements that, for purposes of brevity and clarity, are summarized in the following four statements.

- Provide teaching programs to ensure a supply of competent trainers, teachers, field workers, and advisors, to address the needs of rural women.

- Through research, broaden the knowledge base for addressing current problems of women and agricultural households.

- Improve rural agricultural productivity and family welfare through adapted extension services.

- To provide training programs to improve understanding and integrate knowledge in the areas of women and agricultural households.

Of note is the fact that mission and goals statements emphasized the importance of teaching, research and extension functions in assisting rural women. From participants' perspectives, a future program would clearly require an established knowledge base and continual research as a basis for understanding women and agricultural households. In addition, this information would have practical implications in that it is intended to be used by field workers, advisors, trainers, and teachers in their work with rural women. This information is also intended to be used by women themselves in the form of improved technologies, organizational skills, and other information that will increase their productivity and household well-being. In fact, the mission statements conceptualize women as critical actors in the development process at the household, community, national, and regional levels.

Also of note, these mission and goals statements establish UCD as a leader in integrating women into the national and regional development process by targeting women for research and extension activities, and training a competent cadre of graduates who are prepared to work with rural women. Furthermore, these statements envision UCD as playing an ongoing role in training by providing continuing education and updated information to field staff.

Objectives and Curriculum Content

Five major areas of objectives were established by group consensus to guide discussions of curriculum content: agricultural and livestock production; problems of women and agricultural households; health, education, and environment; women's income; and community and government organizations. For each area, participants developed objectives that were considered to be desired student outcomes, i.e., what students need to know or be able to achieve on the job to address the needs of women and agricultural households. Participants then established content needed to meet these objectives. Objectives and content for each of the five program areas are reviewed in the following section.

1. Agricultural and Livestock Production

Objectives

- Improve food crop production qualitatively and quantitatively through extension programs and appropriate technology.
- Increase agricultural and livestock production.
- Introduce to households new ideas based on solid information while strictly respecting societal norms and values.

Content

- Soil Chemistry
- Climatology
- Fertilization
- Seeds
- Plant Protection
- Cultural Practices
- Animal Production Techniques
- Forestry
- Farm Management
- Appropriate Technology for Food Crop Production
- Conservation, Processing, and Storage of Food Crops

2. Problems of Women and Agricultural Households

Objectives

- o Generate interest in women's issues among potential students, the public, and other rural organizations through brochures, TV, etc.
- o Identify needs and problems of women and agricultural households.
- o Propose research topics that have application to household socio-cultural and economic problems.

Content

- Land Tenure
- Agricultural Credit
- Study of Responsibilities of Women in Agricultural Households
- Education Directed to Adult Women in Agricultural Households
- Instructional Techniques for Adults
- Integrated Approach to Solving Women's Problems

3. Health, Education and Environment

Objectives

- o Raise family living standards through health education, functional literacy, and home management skills.
- o Improve access to adult education.
- o Improve nutritional health status of women and their families.

- o Improve the woman's environment.
- o Increase household management skills.
- o Develop courses and teaching aids that reflect women's needs.
- o Improve educational level.

Content

Family Structure, Economics and Cultural Influences	Understanding and Solving Nutritional Problems
Family Health, Hygiene, Sanitation	Household Management and Economics
Primary Health Care in Rural Areas	Environmental Studies
Maternal and Child Care	Family Planning
Basic Nutrition	

4. Women's Income

Objectives

- o Raise rural women's income by helping them diversify their activities and organize marketing of their products.
- o Promote socioeconomic changes by enhancing rural productivity and family welfare.
- o Identify non-agricultural problems and seek assistance.
- o With government support, assist rural families in identifying their problems and resources for improving their own progress in development.

Content

Income Generating Potential for Women (i.e. indigenous handicrafts and art, apparel production, in-home child care, home processed foods).	Marketing, Exposition and Sale
	Small Business Management
	Women's Cooperatives

the needs of women and agricultural households may be most appropriate to implement at UCD.

A multi-disciplinary program would provide an appropriate theoretical perspective that encompasses the many, complex, and interrelated needs of agricultural households. In addition, a balanced perspective on the impacts of social variables (e.g., socioeconomic status, household division of labor, and cultural factors) as well as technical interventions, is necessary to accurately reflect the environmental and social context in which technological innovation and adoption takes place. Such a program would draw from the most relevant areas of the disciplines but not replicate either agriculture or home economics. Following additional planning and program development the most appropriate label for the concentration could be determined.

Recommendations for Further Planning

Participants generated considerable momentum to initiate and implement a women and agricultural households program at UCD. Their recommendations provide a useful starting point for program development. The following measures are now needed to ensure that necessary conditions are set in place to continue the work begun in the shortcourse.

- o Select and establish an advisory group of key ministry and organizational representatives to maintain continuing dialogue with UCD and to periodically contribute to the continued planning of a program focused on the needs of women and agricultural households.
- o Select and establish a working group of UCD faculty to provide leadership and direction as UCD continues with the planning initiated during the shortcourse. This group should be comprised of faculty who provided leadership during the shortcourse, as well as other interested faculty.
- o In the faculty working group, immediately begin to identify existing courses in the UCD curriculum that could be strengthened to put greater emphasis on women's needs.
- o In the faculty working group, identify and propose new courses to be added in content areas not presently being addressed (e.g., health education; maternal and child health and nutrition; adult literacy; and food processing, preservation and storage.)
- o Conduct an evaluation of the new courses and consider developing a program option; consider eventually developing a department. This is a judicious approach that would both target and justify the expenditure of resources in needed areas.

5. Community and Government Organizations

Objectives

- o Develop women's management capacities and leadership potentials (increase capacity in decision-making).
- o Identify the structural imbalances which compound and perpetuate women's disadvantages at the family, community, and national level.
- o Evaluate the impact of agricultural policies on women.

Content

Rural Environment and Societies	Survey Techniques in Rural Areas
Study of Institutions Working in Rural Areas	Study and Analysis of Women's Status in Rural Communities
Legislative and Agricultural Households	Leadership and Decision-making Skills
Community Development	Data Collection and Analysis
Demography	Group Dynamics
Project Analysis	Communication Patterns

The content described by work groups was multi-disciplinary and broad in scope, creating a unique program. Objectives and content bridged the majority of disciplines in agricultural departments currently in UCD, and included selected areas of home economics and women in agriculture not currently in existence at UCD. These outcomes clearly support the need for innovative thinking to continue this planning process at UCD.

Design Considerations

As described in the preceeding sections, participants worked through the ideal curriculum development process during the first part of the week. Work groups developed statements of program needs, mission goals, objectives, and content.

There are, however, institutional and contextual constraints that would influence the type of program that could be realistically established. The module on Design Considerations was focused on the type of program form that appears feasible at UCD, given existing and needed resources.

Work groups were asked to address the following questions:

- What is the program potential at UCD?
- Where should such a program be located?
- What are the institutional resources and needs that would affect the establishment and operation of a program at UCD?
- Is preparation of applicants adequate for entrance into a program?

Group responses to these questions are summarized below.

Potential programs

Participants emphasized that most subjects that could contribute to a program are currently offered at UCD, although some components would need to be strengthened and other courses added to build a complete program on women and agricultural households. Areas that need strengthening include nutrition, communication techniques, practicals, and field training. According to participants, courses or content that need to be added are health education, adult literacy, and home economics. In addition, greater attention needs to be directed toward food processing, storage, and preservation. Both work groups assigned this question suggested that if evaluations of effectiveness of core courses are supportive, option and/or degree status may be considered.

Location

Participants agreed that UCD is the suitable location for a women and agricultural households program. The Department of Rural Economics and Extension was suggested as a possible departmental base. Both technicians and engineers would receive some training in the common trunk courses or, for engineers, in the option.

Resources

The following resources were considered necessary for a program: administrative personnel; infrastructure, including offices, classrooms,

and labs; teaching and classroom materials, such as audio-visual equipment, lab materials, and tables and chairs; and automobile parking. Institutional needs included buildings that would house offices, labs, and classrooms; labaoratory technicians; equipment; teaching materials; additional training for instructors and trainers; and instructional personnel.

Applicants

Applicants were considered to be adequately prepared for entrance into the potential program. Evidence cited was UCD's record of low drop-out rate and performance level prior to admission. There were some concerns about attracting women to study at UCD and providing financial support to qualified applicants.

Summary

This section has provided information about the step-by-step process which participants followed to practice each aspect of curriculum planning and to develop a set of program recommendations. The final step in this process was the facilitators' summary of the group's content recommendations, assessment of program potentials and resources and needs, and program goals. These components were presented visually on flipcharts so participants could examine the broad foundations, constraints, and directions of a potential program.

Participants were asked, "Given the goal statements generated by the group, and given the available and needed resources, does this group wish to recommend that a program be established?" The group responded affirmatively, and potential program statements were used as a basis for formal recommendations. The statement of recommendations was developed by a group of four selected participants and was discussed with the entire group for approval prior to being presented at the closing ceremonies. The recommendations were presented in the Overview Section and in Appendix B. We will return to a discussion of the outcomes of the shortcourse following a summary of evaluation results.

EVALUATION RESULTS

Three evaluations were conducted during the training, including an overall evaluation, evaluation of segments on women and agricultural households, and an evaluation of segments on curriculum planning. Copies of each evaluation form are presented in Appendix D. In general, results were overwhelmingly positive and indicated that the workshop was successful in meeting its intended purposes of providing participants with training on curriculum planning skills and a forum for exchange with ministry and organization representatives.

Overall Evaluation

When asked how much the shortcourse increased their understanding of how to use a curriculum planning model, 96% of participants who responded to the evaluation (n=22) said the workshop increased their understanding very much or much as presented in Table 1. Virtually all respondents (100%) believed the information provided in the workshop will be very useful (77%) or useful (23%) in planning how to address women and agricultural households at UCD.

Table 1
Results of Overall Evaluation:
Usefulness of Shortcourse

Question	Percentage of Respondents in Each Rating Category			
	Very Much	Much	Very Little	None
How much did this workshop increase your understanding of how to use a curriculum planning model to analyze a curriculum?	55% (12)	41% (9)	4% (1)	0%
How useful will the information provided be in planning how to address women and agricultural households at UCD?	77% (17)	23% (5)	0%	0%

In addition, 77% (n=21) of respondents felt they personally could develop a good plan to guide the development of courses to increase awareness of issues related to women and agricultural households. These results are presented in Table 2.

Table 2
Results of Overall Evaluation:
Usefulness for Planning Courses on Women and Agricultural Households

Question	Percentage of Respondents in Each Rating Category	
	Yes	No or Uncertain
Do you feel you could develop a good plan to guide the development of courses to increase awareness of issues related to women and agricultural households?	77% (17)	18% (4)

Note: Participants expressing some uncertainty in developing courses indicated a need for further collaboration with others already working in this area or for more information about social sciences or women's issues.

When asked if the workshop helped them identify areas of collaboration between UCD and other organizations, 90% of respondents (n=22) indicated that the workshop was very helpful or helpful, as indicated in Table 3.

Table 3
Results of Overall Evaluation:
Opportunity for Collaboration

Question	Percentage of Respondents in Each Rating Category			
	Very Helpful	Helpful	Little Help	No Help
To what extent do you feel this workshop has helped you identify areas of collaboration between UCD and other organizations, to develop programs to meet the needs of rural women?	45% (10)	45% (10)	10% (2)	

Participant comments regarding this collaboration included the following. "The presence of women representing different organizations and particularly their contribution was helpful." "Interactions with ministry representatives were highly resourceful." "Working most of the time on development issues (global view) the new program gives me grounds to collaborate with UCD." "Already, a faculty member has discussed the possibility of carrying out a joint project with me." Two comments that expressed some reservation about collaboration suggested that although areas of collaboration were identified, it remains up to individuals to follow through and establish a linkage.

Women and Agricultural Households

The evaluation of training on women and agricultural households was aimed at assessing how much participants' knowledge increased regarding selected topics. Over 80% of respondents (n=18) reported their knowledge had increased much or some as a result of training in the following topics.

Table 4
Evaluation of Women and Agricultural Households Topics

Question	Percentage of Respondents in Each Rating Category			
	Much	Some	Little	None
How much did this workshop increase your understanding of...				
Differences between men's and women's farm and household activities?	50% (9)	39% (7)	5.5% (1)	5.5% (1)
Resources that affect farm productivity?	33% (6)	50% (9)	11% (2)	6% (1)
A concept of agricultural households?	67% (12)	22% (4)	5.5% (1)	5.5% (1)

Virtually all respondents (94%; 6% blank) found the case study teaching technique useful or very useful for household activities and resources and applying concepts related to curriculum development. Although some respondents indicated they had a background in this area, participants more frequently recommended that additional time be given to this unit, particularly to exploring the case studies in greater depth.

Respondents strongly supported training in the area of women and agricultural households. All respondents (100%) believed that women's work is important to Cameroon's agricultural production and food self-sufficiency. Eighty three percent believed that extension workers need additional training to work with rural farmers. In terms of UCD's role, 88% of respondents agreed with the statement that it is important to develop courses about women and agricultural households (6% strongly disagreed, and 6% didn't know, i.e., were undecided). However, 95% of respondents agreed that it is important to include content on women and agricultural households in courses, and 5% were undecided.

Curriculum Planning

Participants were asked to evaluate the shortcourse segments on curriculum planning in terms of helpfulness for planning a program on women and agricultural households. As presented in Table 5, respondents overwhelmingly felt that the training was helpful in developing their planning skills for each step of curriculum planning. Respondents rated the workshop as particularly helpful in the areas of generating program and learning objectives (100% helpful or very helpful), identifying needs for a program (96% helpful or very helpful), and identifying existing or needed courses in the curriculum that are relevant to women and agricultural households (92% helpful or very helpful for both categories). Respondents also rated highly the training on developing goals statements (90% helpful or very helpful) and identifying recommendations for UCD (96% helpful or very helpful).

Table 5
Evaluation of Curriculum Planning Topics:
Curriculum Planning Skills for Women and Agricultural Households

Question	Percentage of Respondents in Each Rating Category			
	Very Helpful	Helpful	Little Help	No Help
How helpful will this workshop be as you ...				
Identify needs for an instructional program relative to women and agricultural households?	58% (14)	38% (9)	4% (1)	0%
Develop a statement of goals for a curriculum?	58% (14)	42% (10)	0%	0%
Generate program and learning objectives?	54% (13)	46% (11)	0%	0%
Identify courses in the current curriculum at UCD that are relevant to women and agricultural households?	42% (10)	50% (12)	4% (1)	0%
Identify additional courses or content needed to address women and agricultural households?	54% (13)	42% (10)	0%	0%
Identify a list of recommendations for developing a curriculum at UCD related to women and agricultural households?	58% (14)	38% (9)	4% (1)	0%

Note: Where respondents do not total 24, answers to that question were blank.

Respondents described the training as enriching, very helpful, and impressive. Respondents also appreciated the contributions made by outside participants. There was some concern about carrying out the planning process on an individual basis.

Respondents (n=24) also found the workshop helpful in providing general information on curriculum development that could be applied to the development of any educational program, as presented in Table 6. Again, the training in content selection and planning seemed particularly beneficial, with 96% of respondents rating these segments as helpful or very helpful in increasing their knowledge in these areas. In addition, 90% or more believed the workshop increased their understanding of the conceptual framework for planning (92%), improved their ability to identify key players or actors in the planning process (91%), and would help them develop an outline for curriculum document (91%).

Table 6
Evaluation of Curriculum Planning Topics:
Generic Curriculum Planning Concepts and Skills

Question	Percentage of Respondents in Each Rating Category			
Question	Very Helpful	Helpful	Little Help	No Help
How helpful was this workshop in increasing your understanding of...				
Curriculum	46% (11)	42% (10)	12% (3)	0%
Curriculum development	50% (12)	42% (10)	8% (2)	0%
A conceptual framework for developing a master management plan	42% (10)	50% (12)	8% (2)	0%
How helpful will this workshop be to you as you...				
Identify key players in the curriculum development process	29% (7)	71% (7)	0%	0%
Detemermine the preliminary work that should occur before creating a master management plan for an instruction program	42% (10)	50% (12)	4% (1)	0%
Establish criteria for selecting curriculum content	29% (7)	67% (16)	4% (1)	0%
Identify steps of a plan for selecting and organizing curriculum content	33% (8)	63% (15)	4% (1)	0%
Develop an outline to create a curriculum document	33% (8)	58% (14)	8% (2)	0%

Note: Where respondents do not total 24, answers to that question were blank.

Content, Format, and Level

Participants were asked to provide feedback regarding shortcourse content, format and level. In general respondents (n=22) felt that the workshop addressed the most important topics, with 59% stating all the most important topics were covered, and 41% that some of the most important topics were covered. Answers to open-ended questions asking for suggestions about additional topics included suggestions for collaboration between university faculty and organization representatives, demographics, teaching approaches, and home economics.

Participants were asked to rate the length of time spent on each major segment of training according to whether it should be expanded, omitted, shortened, or kept as is. Respondents said they would like more information on women and agricultural households: 68% recommended that the module on Women and Agricultural in Cameroon be expanded. In general, participants were satisfied with the length of the curriculum development segments of the workshop, with 50% or more suggesting that the following segments remain as is: Forces Affecting Curriculum (64%), What is Curriculum (50%), Curriculum Diagnosis (50%), and Content and Experience Selection (50%). The group was also satisfied with the time spent on developing recommendations (64%).

On the other hand, a sizeable minority recommended that additional time be given to the curriculum development core: What is Curriculum (41%), Curriculum Diagnosis (32%), and Content and Experience Selection (32%), and Implementation, Evaluation, and Maintenance (50%). These findings indicate that some faculty would like additional information on the planning process particularly on the steps involved as they proceed from the planning steps and begin to actually implement a program.

The shortcourse appeared to be aimed at an appropriate level. Over two-thirds of respondents (77%) found the level of presentation about right. One participant noted that "The level of the debate was high and the debate itself very frank and rich."

The majority of respondents (n=21) felt that the overall length of the course was about right (59%). Nevertheless, nearly one-third felt the workshop was too short (32%). Most participants felt the daily schedule was about right (64%), but nearly one-third (32%) found the schedule too long. In their comments, several participants requested some leisure time during the week. Thus, although respondents saw a need for additional training in specific areas, this training would best be provided in additional workshops.

Participants (n=21) rated highly the Sourcebook of materials, with 87% finding the material very useful or useful. Language differences posed difficulties for some participants, and several people requested that translations be provided prior to the workshop so that participants could be prepared and delays encumbered by in-process translations could be avoided.

CONCLUSIONS AND IMPLICATIONS

The shortcourse discussed in this report provided a forum for faculty and selected ministry and organization representatives to examine if and how a program at University Center of Dschang could prepare graduates to address the needs of women and agricultural households. The shortcourse provided training in curriculum planning that will enable faculty to implement the preliminary steps of program development. Results of group work sessions and specific recommendations have provided the foundation for continued dialogue, planning, and program proposals.

In addition, there are two themes that underlie participant discussions and recommendations and that can impact future planning and decision-making regarding the direction a program will take. Participants consistently returned to: (a) types of efforts that are needed to reach rural women, and (b) the type of training needed to prepare graduates to work with rural women.

Efforts Needed to Reach Rural Women

According to participants, there is a strong need for women in agricultural households to be educated on both a formal and informal basis if Cameroon is to meet its national goal of maintaining food self-sufficiency and make additional progress in national development. Research supports this emphasis, finding that formal education is consistently associated with indicators of development such as improved standards of living, nutrition, and health care. Participants noted that because women play a central role in household functioning, it is crucial to direct educational efforts to them, and ministry representatives clearly articulated this need in keynote presentations. For example, Mrs. Pentang's statement, "educate women and you educate society" was echoed throughout those presentations. Consistently group sessions with all participants saw this as an over-riding need during needs analysis exercises.

In addition, participants felt that extension education is needed to assist women with technical aspects of agricultural production that may ultimately affect both food production and household economic well-being. Also, literacy training was considered fundamental to assisting women in developing and managing businesses and small-scale income generating activities.

Although the many and complex needs of rural women have been documented and were recognized and articulated by this group,

participants also found that community outreach and development efforts have difficulty reaching rural women. One major reason may be the lack of graduates trained specifically to target women's needs. For example, preliminary data from the 1989 UCD Tracer Study of Graduates (Tchala-Abina, 1989) emphasized that additional training is required to prepare graduates to address the needs of rural women.

In addition, because of difficulties reaching rural women through traditional extension efforts, a cadre of trained women may be needed to conduct this field work, i.e., to coordinate technicians and develop and direct programs. This suggests that UCD must attract qualified female applicants and provide the necessary academic and field experiences to prepare them to conduct successful programs. The 1989 UCD Tracer Study for Graduates also underscores this point, stating that, "Given the important role of women in agriculture it is advisable that a policy be adopted in UCD to favor the admissions of more female candidates. At the same time, policy measures must be taken to allow for an adequate distribution of female graduates throughout the country.... There must be judicial utilization and assignment in the field so that the expected effect of these graduates on rural women (can) be achieved."

Participants also emphasized a need to provide continuing education programs to professionals who previously completed their training, both to prepare them to work with women and agricultural households and to provide periodic updates on recent research and educational methods. Shortcourse participants anticipated that faculty research and technical expertise could enable UCD to play an important role in providing effective continuing education programs.

Training Needed to Prepare Graduates

The second persistent theme was the type of training needed to prepare graduates. Participants emphasized that a teaching program must have a sound research base to provide graduates with a solid academic background at the college level. In addition, participants considered practical skills that would enable graduates to conduct outreach efforts to be an integral part of a program, and recommended that practical experience be provided through field experiences and activities. The implication for the teaching program is that attention must be given to designing courses that provide both conceptual frameworks and analytic tools for use in the field. In addition, field experiences must be carefully designed and supervised. Further exploration concerning joint programs with institutions such as the Pan African Institute is needed to consider how field experiences can be developed to help students apply theoretical and research-based knowledge, as well as to practice technical skills.

Participants' statements of mission and goals, needs, objectives, and program content identified several areas a program would address: agricultural and livestock production; health, education and nutrition; community and government organizations; women's income; and problems of women and agricultural households. These findings suggest that an innovative, multi-disciplinary program assigned specifically to address

- Continue to use "women and agricultural households" as a working label while planning a multidisciplinary approach. Traditional labels may inhibit and limit innovations in designing the program. When the content is clearly established, an appropriate label can be identified that clearly describes the program and supporting disciplines.

- Examine faculty areas of specialization and how faculty could contribute discipline-based knowledge to the program. Identify faculty with potential for playing leadership roles in program development.

- Work toward preparing new faculty specifically to give leadership to a program.

- Build a strong academic base for the program by continuing research and using this information in practical, field applications.

- Continue to collaborate with other institutions (e.g., Pan-African Institute and others) for practical training of field workers.

- Identify needed educational materials to support a women and agricultural households instructional program. Work with librarian to purchase resource materials.

Although the importance of women and agricultural households to development efforts has been recognized, there is little available information about how to integrate this area into educational programs. Procedures for building on research and theory and providing practical applications, as well as for establishing a multidisciplinary approach, are particularly challenging. UCD is breaking new ground and we are prepared to support the development of such an innovative program.

The documentation of the training process and outcome compiled in this technical report should provide faculty and administration with useful references for program development. We can clarify any information regarding content or format of the training or make suggestions about follow-up mini-courses. We will also be preparing conference proceedings, including paper presentations and group reports. As requested, we will be available to provide periodic short-term consultancy to the UCD faculty working group.

We believe there is considerable potential for UCD to emerge as a leader in this area, given some time to go through the process of developing a program. Where possible and appropriate, we will assist UCD in working toward regional leadership in curriculum planning for women and agricultural households programs.

REFERENCES

Cloud, K. (1985). Women's productivity in agricultural systems: Considerations for project design. In C. Overholt, M. B. Anderson, K. Cloud, and J.E. Austin (Eds.), Gender Roles in Development Projects (pp. 17-56). West Hartford, CN: Kumarian Press.

Doll, R. C. (1986). Curriculum improvement: Decision making and process (3rd ed.). Newton, MA: Allyn and Bacon.

Hall, G. E. and Hord, S. M. (1987). Change in Schools: Facilitating the Process. Albany, NY: State University Press.

Hunkins, F. P. (1980). Curriculum development: Program improvement. Columbus, OH: Charles E. Merrill Publishing Company.

Jones, C. (1986). Intra-household bargaining in response to the introduction of new crops: A case study from North Cameroon. In J.L. Moock (Ed.), Understanding Africa's Rural Households and Farming Systems (pp. 105-123). Boulder, CO: Westview Press.

Kilo, R. (1989, July). Problems and potentials for rural women in Cameroon. Paper presented at the shortcourse, "Curriculum Planning with an Emphasis on Women and Agricultural Households," conducted at University Center of Dschang, Dschang Cameroon, July 10-15, 1989.

Koons, A. S. (1988, April). Reaching rural women in the Northwest Province: A presentation of more ways in which women are not men. In Conference on Development in Cameroon: The Role of Food and Agriculture. Conference conducted at the University of Florida, Gainesville, April 7-9, 1988.

Nyemba, J. (1987). Goal incongruities in Cameroon extension programs. Journal of Rural Cooperation, 14(2), 143-159.

Nyemba, J. (1989, April). African Rural Communities and African Women in Rural Development. Paper presented at the Women in Agriculture Development Lecture Series, University of Florida, Gainesville, April 26, 1989.

Overholt, C., Anderson B., Cloud, K., and Austin, J.E. (1985). Gender Roles in Development Projects. Boulder, CO: Westview Press.

Pentang, R. (1989, July). Problemes et Potentials de la femme rurale au Cameroon. Paper presented at the shortcourse, "Curriculum Planning with an Emphasis on Women and Agricultural Households," conducted at University Center of Dschang, Dschang Cameroon, July 10-15, 1989.

Schubert, William H. (1986). Curriculum. New York: MacMillian Publishing Company.

Staudt, K. (1975-76). Women farmers and inequities in agricultural services. Rural Africa, 29, 81-94.

Tchala-Abina, F. (1989). Tracer study of UCDs graduates. Unpublished manuscript.

APPENDIX A

APPENDIX A

Names of Participants and Organizational Affiliations

Representatives of Ministries

Mme. Fouda Appolonie	Ministry of Social and Women's Affairs
Mme. Pentang Pagina Rosalise	Ministry of Community Development
Mme. Kilo Galabe Regina	Ministry of Community Development
Miss Maria Dibo Epie	Ministry of National Education
Mrs. Claire Fonkeng	Ministry of National Education
Dr. Alice Bell	Researcher, Nutrition Center, Ministry of Higher Education

Representatives Of Other Organizations

Mr. Amouye Nquettakan	Pan African Institute, Douala
Dr. Christopher Atang	Pan African Institute, Buea
Dr. Fomunyan Ruby Tifu	IRZ Station-Mankon
Mme. Kanisee-Kom Emma Victorie	Maison de la Femme, Yaounde
Mme. Youssouf Hadidja Alim	Maison de la Femme in Garoua

UCD Faculty Representatives

Dr. Achenjang Fidelis M.	Basic Science
Dr. Agnerah-Atcham Therese	Plant Protection
Mrs. Aighewi-Mbah Beatrice	
Dr. Joseph E. Beringuy	Agricultural Engineering
Mr. Bikoma Mbouomo Rene	Agriculture
Mr. Batomogna Jean Jules	Agricultural Engineering
Dr. Bouda Hamilton	Basic Science
Mr. Boukang Alixis	Soil Science
Mr. Eloundou Enyegue Parfait	Rural Economics and Extension Education
Mr. Faa Pierre	Agriculture
Mr. Hiol Hiol Francois	Forestry
Mr. Ngouana Theodore	Physical Education
Mrs. Nguy-Ntamag Francoise Caroline	Agriculture
Dr. Nkwain Sama Joseph	Rural Economics and Extension Education
Dr. Nyemba Ambela Jean	Rural Economics and Extension Education
Dr. Jean Ongla	Rural Economics and Extension Education (and MESIRES)
Dr. Parh Ignatius Amah	Plant Protection
Mr. Tarla Francis Nchembi	Agriculture
Dr. Tchouamo Issac	Rural Economics and Extension Education
Mr. Zoa Mboe Appolinaire	Animal Science

APPENDIX B

Appendix B

Recommendations by Participants Regarding University Center of Dschang's Role in Curriculum Planning For Women and Agricultural Households

Presented at University Center of Dschang

15 July, 1989

From 10 - 15 July, 1989, a seminar on Curriculum Planning With An Emphasis On Women and Agricultural Households, jointly sponsored by the University of Florida, the University Center of Dschang, the United States Agency for International Development (Agricultural Education Project), grouping Faculty of the University Centre of Dschang, representatives of the Ministries of Social and Women Affairs, Agriculture, National Education, Research Institutes (Institute for Animal Research and the Institute for Medicinal Research and the Study of Medical Plants), and the Pan African Institute for Development (Buea and Douala) was held at the University Center of Dschang.

The objectives were to :

- Provide participants with the knowledge and skills to design and implement a program addressing the needs of women and agricultural households or other concentrations at the University Centre of Dschang.
- Provide a forum for establishing working relationships between the University Centre of Dschang, government ministries, and others involved in the development and delivery of programs that address the needs of rural women.

The seminar began with an overview of women and agricultural households. Representatives of some ministries presented reports on the situation of women in general and the rural women in particular and also highlighted actions being taken.
Presentations were followed by lively discussions on the issues raised. Following the discussions participants identified the needs of Cameroonian women in agricultural households. With these needs in view, participants were introduced to additional forces affecting curriculum planning. Then they went through the curriculum planning process including mission, goals, objectives and general areas of content.

Subsequent to the needs identified through the above process and,

- Considering the importance placed on the woman by the Head of State,

- Considering the importance of agriculture in Cameroon and the constant need to sustain and improve the country's food self sufficiency;
- Considering the high percentage of women population involved in agriculture and more specifically in food production;
- Considering the responsibility that women bear for family welfare and the society;
- Considering the needs of women and agricultural households;
- Considering the little attention currently directed to educational programs addressing women's needs in training institutions in general and the University Centre of Dschang in particular;
- Considering the need to strengthen existing courses and the absence of content that directly addresses women's needs;
- Considering the underrepresentation of women employed in extension education programs and the needs of women for extension information;

We, the participants of this seminar recommend that :-

- UCD should provide teaching programs to ensure a supply of competent manpower to address the needs of women in general and rural women in particular.
- UCD should strengthen existing courses that relate to women in agricultural households.
- In the short run, UCD should introduce new courses to address specific needs of women in agricultural households, and in the long run, following appropriate evaluations, these courses could lead to the creation of a program in one of the options and eventually a department.
- UCD should study the possibility of increasing the intake of women students.

Done at Dschang, July 15, 1989.

APPENDIX C

CURRICULUM PLANNING WITH AN EMPHASIS ON WOMEN AND AGRICULTURAL HOUSEHOLDS

A Shortcourse offered at the University
Center of Dschang, Cameroon
July 10-16, 1989

AGENDA

DAY ONE

Monday, 10 July

INTRODUCTIONS AND OVERVIEW

Registration (cont.)

Opening ceremonies

Introductions, expectations, objectives

BREAK

Overview of Women and Agricultural Households

Overview of Curriculum Development

LUNCH

Module 1: INTRODUCTION TO WOMEN AND AGRICULTURE IN CAMEROON

Paper presentations

Film on Women in Agriculture in Africa

Group discussions and reports

DAY TWO

Tuesday, 11 July

Module 1 (cont): INTRODUCTION TO WOMEN AND AGRICULTURE IN CAMEROON

Participant discussions:

* What's being done by organizations to address women and agricultural households?
* What are some problems your ministry, organization, or UCD have in addressing the needs of rural women?

Summary of Issues

BREAK

Module 2: WOMEN AND AGRICULTURAL HOUSEHOLDS

Agricultural Households: Key Concepts

Household Activities and Time Use
Case study analysis

LUNCH

Intrahousehold Relationships

Access to and Control of Resources
Case study analysis

BREAK

Agricultural Households, cont.

DAY THREE

Wednesday, 12 July

Module 3: FORCES AFFECTING CURRICULUM DEVELOPMENT

Egerton College Case Study

Large group discussion of Forces Influencing Curriculum Development

BREAK

Small group discussion of Implications for UCD

LUNCH

Module 4: WHAT IS CURRICULUM AND HOW IS IT DEVELOPED?

Review of Concepts

Introduction of Curriculum Planning Model

BREAK

Overview of Levels of Curriculum at UCD

DAY FOUR

Thursday, 13 July

Module 5: CURRICULUM DIAGNOSIS

Summary of Situational Analysis:
* Addressing Needs
* Needs Analysis
* Needs Assessment

Large group discussion of Major Inputs

BREAK

Define the Role of Mission

Small group discussion of UCD Mission

LUNCH

Goals
* Concepts
* Case study analysis

Small group discussion of potential goals for UCD Women and Agricultural Households Program

Objectives
* Concepts

Small group discussion of potential objectives for Women and Agricultural Households Program

DAY FIVE

Friday, 14 July

Module 6: CONTENT AND EXPERIENCE SELECTION

Small group discussion of Goal-Based Content Selection

Review of Criteria for Content Selection

BREAK

Foundations for Women and Agricultural Households Program at UCD

LUNCH

Module 6, cont: CONTENT AND EXPERIENCE SELECTION

How People Learn

Large group discussion of Learning Experiences
Analysis of application at UCD

BREAK

Module 7: CURRICULUM IMPLEMENTATION
Developing a Curriculum Document

Large group discussion of:
* Institutional Design, and Resource Considerations
* Where have we been? Where do we need to go?

Large group work on Mission and Goals; Rationale Statement; Content and Experience Selection; Resources; Institutional Structure and Design

DAY SIX

Saturday, July 15

Small group work
* Presentation of recommendations for developing a program at UCD:
  Rationale statement
  Content and Experience Selection
  Resources
  Institutional Structure and Design

BREAK

Wrap up and evaluations

LUNCH

Closing ceremonies
* Recommendations
* Recognition of committee
* Presentation of certificates

APPENDIX D

Evaluation
UCD of Dschang
July 10-16, 1989

1. How much did this workshop increase your understanding of the following topics (circle your response)?

Topics	Much	Some	Little	None
Differences between men's and women's farm and household activities	M	S	L	N
Factors that influence decisions about time use	M	S	L	N
Resources that affect farm productivity	M	S	L	N
A concept of agricultural households	M	S	L	N

Comments: _____

_____

_____

2. How useful were the following case studies as a teaching tool (circle your responses)?

Case Studies	Very Useful	Useful	Little Use	No Use
Tanzania household activities and resources	VU	U	LU	NU
Intra-household decision making in North Cameroon	VU	U	LU	NU
Egerton College Curriculum	VU	U	LU	NU

Comments: _____

_____

_____

OVER →

3. What is your point of view about the following topics (circle your responses)?

Topics	Strongly Agree	Agree	Disagree	Strongly Disagree	Don't Know
Women's work in agriculture is not important to Cameroon's agricultural production and food self-sufficiency.....	SA	A	D	SD	DK
Extension workers need additional training to work with rural women farmers	SA	A	D	SD	DK
It is not important to include content about women and agricultural households in courses at UCD.....	SA	A	D	SD	DK
It is important to develop courses about women and agricultural households at UCD	SA	A	D	SD	DK

Comments: _____

_____

_____

4. Are you (check one):

____ UCD Faculty

____ representative of a ministry or other organization

clt1-6/20/89

Evaluation
Curriculum Planning
UCD of Dschang
July 10-16, 1989

1. How helpful will this workshop be to you in (circle your response)?

	Very Helpful	Helpful	Little Help	No Help
a. identifying philosophical and social influences on the development of a curriculum addressing needs of rural women	VH	H	LH	NH
b. identifying key players in the curriculum development process	VH	H	LH	NH
c. determining the preliminary work that should occur before creating a master management plan for an instruction program	VH	H	LH	NH

Comments: _____

_____

2. How helpful was this workshop in increasing your understanding of (circle your response):

	Very Helpful	Helpful	Little Help	No Help
a. curriculum	VH	H	LH	NH
b. curriculum development	VH	H	LH	NH
c. a conceptual framework for developing a master management plan	VH	H	LH	NH

Comments: _____

_____

3. How helpful will this workshop be as you (circle your response):

	Very Helpful	Helpful	Little Help	No Help
a. identify needs for an instructional program relative to women and agricultural households	VH	H	LH	NH
b. develop a statement of goals for a curriculum	VH	H	LH	NH
c. generate program and learning objectives	VH	H	LH	NH

Comments: _____

_____

OVER →

4. How helpful will this workshop be as you (circle your response):

	Very Helpful	Helpful	Little Help	No Help
a. establish criteria for selecting curriculum content	VH	H	LH	NH
b. identify steps of a plan for selecting and organizing curriculum content	VH	H	LH	NH
c. identify courses in the current curriculum at UCD that are relevent to women and agricultural households	VH	H	LH	NH
d. identify additional courses or content needed to address women and agricultural households	VH	H	LH	NH

Comments: _____

_____

5. How helpful will this workshop be as you (circle your response):

	Very Helpful	Helpful	Little Help	No Help
a. develop an outline to create a curriculum document	VH	H	LH	NH
b. identify a list of recommendations for developing a curriculum at UCD related to women and agricultural households	VH	H	LH	NH

Comments: _____

_____

6. Are you (check one)

____ UCD faculty

____ representative of a ministry or other organization

clt1-6/20/89

Overall Evaluation

Women and Households in Agricultural Production

UCD of Dachang

July 10-16, 1989

1. How much did this workshop increase your understanding of how to use a curriculum planning model to analyze a curriculum (circle one)?

   Very Much Much Very Little None

   Comments: _____

   _____

2. How useful will the information provided in this workshop be in planning how to address women and agricultural households at UCD (circle your response)?

   Very Useful Somewhat Useful Little Use No Use

   Comments: _____

   _____

3. Do you feel you could develop a good plan to guide the development of courses to increase awareness of issues related to women and agricultural households (check one)?

   ___ yes

   ___ no

   ___ uncertain

   If no or uncertain, what other help do you think you need?

   _____

   _____

OVER →

4. To what extent do you feel this workshop has helped you identify areas of collaboration between UCD and other organizations, to develop programs to meet the needs of rural women (circle your response)?

Very Helpful Helpful Little Help No Help

Comments: _____

_____

5. Did this workshop address the topics you consider most important (circle one)?

All Topics Some Topics None

Comments: _____

_____

6. For each of the following topics, please indicate whether the time spent on the topic should be expanded, omitted, shorten or left as is (circle your response)?

Topic	Expand	Omit	Shorten	As Is
Introduction	E	O	S	A
Women and Agriculture in Cameroon	E	O	S	A
Forces Affecting Curriculum	E	O	S	A
What is Curriculum and How it is Developed	E	O	S	A
Curriculum Diagnosis	E	O	S	A
Content and Experience Selection	E	O	S	A
Curriculum Implementation, Evaluation, and Maintenance	O	S	A	
Group Recommendations	E	O	S	A

Comments: _____

_____

7. What topics would you suggest be added to this workshop?

_____

_____

_____

8. What suggestions do you have for future workshops on women and agricultural households?

_____

_____

_____

9. During this workshop the daily schedule was (circle one):

Too Long Too Short About Right

10. The overall length of this workshop (6 days) was (circle one):

Too Long Too Short About Right

11. How useful were the following workshop materials (circle your response)?

Materials	Very Useful	Useful	Little Use	No Use
Source book	VU	U	LU	NU
Handouts.....	VU	U	LU	NU
Audio visual materials	VU	U	LU	NU

12. Was the level of presentation of subject matter (circle one):

Too Simple Too Complex About Right

13. Are you (check one)

____ UCD Faculty

____ representative of a ministry or other organziation

clt1-6/20/89